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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

GHOWRWAL, OMAR J

ART UNIT

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/594,456	Applicant(s) MAJIMA, TAICHI	
	Examiner OMAR GHOWRWAL	Art Unit 2416	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 September 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 11-16 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 11-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 26 September 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 101

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claim 13 is rejected under 35 U.S.C. 101 as not falling within one of the four statutory categories of invention. While the claims recite a series of steps or acts to be performed, a statutory “process” under 35 U.S.C. 101 must (1) be tied to particular machine, or (2) transform underlying subject matter (such as an article or material) to a different state or thing. See page 10 of *In Re Bilski* 88 USPQ2d 1385. The instant claim is neither positively tied to a particular machine that accomplishes the claimed method steps nor transform underlying subject matter, and therefore do not qualify as a statutory process. The claimed method including steps of receiving, discriminating, determining, and reproducing is broad enough that the claim could be completely performed mentally, verbally or without a machine nor is any transformation apparent. For example, it is not clear as to who or what is performing these steps.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claim 11 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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4. Claim 11 recites the limitation "the signal to be wireless transmitted". There is insufficient antecedent basis for this limitation in the claim.

Claim Objections

5. Claim 11 is objected to because of the following informalities: "the voice" lacks proper antecedent basis and "data identifying of the group" should be "data of identifying the group".

6. Claim 12 is objected to because of the following informalities: "the data" lacks proper antecedent basis.

7. Claim 15 is objected to because of the following informalities: "the control means of executing processing" should be "the control means executing processing".

8. Appropriate correction is required.

Specification

9. The incorporation of essential material in the specification by reference to an unpublished U.S. application, **foreign application** or patent, or to a publication is improper. Applicant is required to amend the disclosure to include the material incorporated by reference, if the material is relied upon to overcome any objection, rejection, or other requirement imposed by the Office. The amendment must be accompanied by a statement executed by the applicant, or a practitioner representing the applicant, stating that the material being inserted is the material previously incorporated by reference and that the amendment contains no new matter. 37 CFR 1.57(f).

Claim Rejections - 35 USC § 103

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10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. **Claims 11-16** are rejected under 35 U.S.C. 103(a) as being unpatentable over WO 99/27745 *JOHNSON et al.* ("*JOHNSON*") in view of U.S. Publication No. 2005/0080870 A1 to *Marks et al.* ("*Marks*").

As to **claim 11**, *JOHNSON* discloses a communication method used in a group call communication in which communication is performed among a plurality of members belonging to a predetermined group (see fig. 3, communication between different devices), the method comprising the steps of:

at a transmitting end, sequentially inputting voice data to be a transmission object, and discriminating whether the voice which is indicated by the inputted voice data is silent (page 9, lines 3-15 whenever a voice activity detector VAD determines that voice is no longer active, a transmitter may enter DTX mode, and it ceases to transmit in every one of its assigned timeslots);

replacing the voice data which is discriminated that it indicates silent voice with silence descriptor "SID" frames (page 9, lines 7-10);

and performing wireless transmission of SID frames, with voice data indicating voice, at a transmitting end (page 9, lines 3-31, DTX periods and non-DTX periods are transitioned between each other when a speech frame and SID frames are transmitted with each other).

and at a receiving end, receiving the signal to be wireless transmitted (page 9, lines 14-31);

discriminating the voice data and the SID frames (page 9, lines 14-31, DTX vs. non DTX periods);

determining whether or not the received signal is to be reproduced, on the basis of the SID frames (page 9, lines 14-31, depending on the state is a DTX period, "comfort noise" or voice is played);

and when it is determined that the received signal is to be reproduced, reproducing voice data for voice data sections and reproducing silence for sections of the SID frames (page 9, lines 14-31, depending on period, "comfort noise" (no voice) based on silence descriptor or voice is played).

JOHNSON does not expressly disclose replacing the voice data which is discriminated that it indicates silent voice with *data identifying of the group*.

Marks discloses one or more header fields in requests from a client may be replaced by a group header identifier (para. 0006).

JOHNSON and *Marks* are analogous art because they are from the same field of endeavor with regards to data processing.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the replacing header fields with a group header identifier as taught by *Marks* into the invention of *JOHNSON*. The suggestion/motivation would have been to reduce overhead of the messages transmitted (*Marks*, para. 0006).

As to claim 12, *JOHNSON* and *Marks* further disclose the communication method according to claim 11, wherein the transmitting end further comprises a step of forming a transmission frame from the voice data and the replaced data of identifying the group (*JOHNSON*, figs. 2, 5, speech is transmitted in frames, *Marks*, para. 0006, group identification in header, i.e. a frame with a header), the step setting a steal flag which shows the presence of the data at the time of transmission (*JOHNSON*, page 5, lines 11-20, flag F1 shows presence of speech data);

and wherein the receiving end further comprises a step of discriminating the presence of the data of identifying the group on the basis of the steal flag in the received signal (*JOHNSON*, page 6, lines 14-15, steal flag F1 utilized in determining whether a given received frame contains speech, i.e. if it is present, there is not any silent data (data identifying group of *Marks*)). In addition, the same suggestion/motivation of claim 11 applies.

As to **claim 13**, *JOHNSON* discloses a receiving method used in a group call communication in which communication is performed among a plurality of members belonging to a predetermined group (see fig. 3, communication between different devices), the method comprising the steps of:

receiving a wireless transmitted signal including data of identifying the group and voice data of representing voice, FACCH identifying signal voice data indicative of silence (figs. 2, 5, page 6, lines 11-14, grouped frames FR within multiframe MF2 can contain either speech or control signals, page 2, lines 23-25 as is understood in the art

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FACCH control signals cause a speech decoder to mute, i.e. transmitter constructs multiframe MF1 to be made up of speech frames, but some of them are silent);

discriminating the voice data and the FACCH in the received signal (fig. 2, 5, receiver detects speech frames from FACCH frames (MF2-MF3));

determining whether or not the received signal is to be reproduced, on the basis of the FACCH (fig. 2, 5, receiver detects speech frames from FACCH frames, reproduces the data in MF3);

and when it is determined that the received signal is to be reproduced, reproducing voice data for voice data sections and reproducing silence for sections of the FACCH (fig. 2, 5, receiver detects speech frames from FACCH frames, reproduces the data in MF3, page 2, lines 23-25 as is understood in the art FACCH control signals cause a speech decoder to mute).

JOHNSON does not expressly disclose *replacing* the voice data which is discriminated that it indicates silent voice with *data identifying of the group*.

Marks discloses one or more header fields in requests from a client may be replaced by a group header identifier (para. 0006).

JOHNSON and *Marks* are analogous art because they are from the same field of endeavor with regards to data processing.

At the time of invention, it would have been obvious to a person of ordinary skill in the art to incorporate the replacing header fields with a group header identifier as taught by *Marks* into the invention of *JOHNSON*. The suggestion/motivation would have been to reduce overhead of the messages transmitted (*Marks*, para. 0006).

As to **claim 14**, see similar rejection for **claim 13**. The method teaches the apparatus.

As to claim 15, *JOHNSON and Marks* further discloses the receiving apparatus according to claim 14, wherein the reception means operates so as to receive a frame signal (JOHNSON, fig. 2, 5 multiframe);

wherein the detection means operates so as to detect predetermined data in a voice signal included in the frame signal (JOHNSON, fig. 2, 5, detecting speech frames);

wherein the reproduction means operates so as to reproduce the voice signal in the frame signal which is received by the reception means (JOHNSON, fig. 2, 5, reproducing speech frames in MF3), and further to reproduce the predetermined voice when data of identifying the group data is detected by the detection means (JOHNSON, fig. 2, 5, reproducing speech frames and FACCH frames in MF3, i.e. using group identifier of Marks for FACCH);

and wherein the control means of executing processing based on the data of identifying the group detected by the detection means (Marks, para. 0006, requests processed based upon the respective group header identifiers). In addition, the suggestion/motivation would have been to reduce the overhead of messages transmitted (Marks, para. 0006).

As to claim 16, *JOHNSON and Marks* further discloses the receiving apparatus according to claim 15, wherein a predetermined control flag which shows the presence of the data of identifying the group is set in the frame signal (JOHNSON, page 5, lines

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11-20, flags F1 and F2 distinguish speech from FACCH, i.e. using group identifier of Marks for FACCH);

and wherein the detection means operates so as to detect the data of identifying the group on the basis of the predetermined control flag (JOHNSON, page 6, lines 14-15, steal flags F1 and F2 are utilized in determining whether a given received frame contains speech or FACCH, i.e. using group identifier of Marks for FACCH). In addition, the suggestion/motivation of claim 15 applies.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to OMAR GHOWRWAL whose telephone number is (571)270-5691. The examiner can normally be reached on Monday-Thursday, 8:00am-5:00pm est..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Derrick Ferris can be reached on (571)272-3123. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/O. G./
Examiner, Art Unit 2416

/Derrick W Ferris/
Supervisory Patent Examiner, Art Unit 2416